

PATENT  
Atty. Docket No. FJN-063  
(3999/66)

9/B  
M.J.G  
4/15/99

**IN THE UNITED STATES PATENT AND TRADEMARK OFFICE**

APPLICANT(S): Nakagawa et al.

SERIAL NUMBER: 09/051,670 GROUP NUMBER: 1643

FILING DATE: September 8, 1998 EXAMINER: Romeo, D.

TITLE: NOVEL DNA AND PROCESS FOR PRODUCING PROTEINS BY  
USING THE SAME

**RESPONSE TO THE NOTICE TO COMPLY WITH REQUIREMENTS**  
**FOR PATENT APPLICATIONS CONTAINING NUCLEOTIDE**  
**SEQUENCE AND/OR AMINO ACID SEQUENCE DISCLOSURES**

**BOX SEQUENCE**

Assistant Commissioner for Patents  
Washington, D.C. 20231

Sir:

In Response to the Notice to Comply with Requirements for Patent Applications Containing Nucleotide Sequence and/or Amino Acid Sequence Disclosures, mailed from the Patent Office on January 4, 1999, a copy of which is attached, we enclose a Sequence Listing in computer-readable form and paper form for the above-referenced application. A paper copy of the substitute Sequence Listing, and an Amendment requesting entry of the substitute Sequence Listing and the addition of sequence identifiers into the Specification are also submitted on even date herewith.

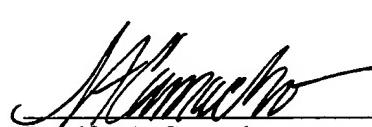
**Applicant:** Nakagawa et al.  
**U.S.S.N.:** 09/051,670  
**Filed:** September 8, 1998  
Page 2

A Petition for Extension of Time Under 37 C.F.R. § 1.136(a) for one month up to and including March 4, 1999 is submitted on even date herewith. In addition, the Commissioner is authorized to charge any additional fees that may be associated herewith to Deposit Account No. 20-0531.

Respectfully submitted,

Date: 3/4/99  
Reg. No. P-43,526

Tel. No. (617) 248-7476  
Fax: (617) 248-7100



Jennifer A. Camacho  
Attorney for the Applicants  
Testa, Hurwitz, & Thibeault, LLP  
High Street Tower  
125 High Street  
Boston, Massachusetts 02110

479JAC3999/66.743402-1



Application No.: 09/051,670

**NOTICE TO COMPLY WITH REQUIREMENTS FOR PATENT APPLICATIONS CONTAINING NUCLEOTIDE SEQUENCE AND/OR AMINO ACID SEQUENCE DISCLOSURES**

The nucleotide and/or amino acid sequence disclosure contained in this application does not comply with the requirements for such a disclosure as set forth in 37 C.F.R. 1.821 - 1.825 for the following reason(s):

- 1. This application clearly fails to comply with the requirements of 37 C.F.R. 1.821-1.825. Applicant's attention is directed to these regulations, published at 1114 OG 29, May 15, 1990 and at 55 FR 18230, May 1, 1990.
- 2. This application does not contain, as a separate part of the disclosure on paper copy, a "Sequence Listing" as required by 37 C.F.R. 1.821(c).
- 3. A copy of the "Sequence Listing" in computer readable form has not been submitted as required by 37 C.F.R. 1.821(e).
- 4. A copy of the "Sequence Listing" in computer readable form has been submitted. However, the content of the computer readable form does not comply with the requirements of 37 C.F.R. 1.822 and/or 1.823, as indicated on the attached copy of the marked -up "Raw Sequence Listing."
- 5. The computer readable form that has been filed with this application has been found to be damaged and/or unreadable as indicated on the attached CRF Diskette Problem Report. A Substitute computer readable form must be submitted as required by 37 C.F.R. 1.825(d).
- 6. The paper copy of the "Sequence Listing" is not the same as the computer readable from of the "Sequence Listing" as required by 37 C.F.R. 1.821(e).
- 7. Other: \_\_\_\_\_

**Applicant Must Provide:**

- An initial or substitute computer readable form (CRF) copy of the "Sequence Listing".
- An initial or substitute paper copy of the "Sequence Listing", as well as an amendment directing its entry into the specification.
- A statement that the content of the paper and computer readable copies are the same and, where applicable, include no new matter, as required by 37 C.F.R. 1.821(e) or 1.821(f) or 1.821(g) or 1.825(b) or 1.825(d).

For questions regarding compliance to these requirements, please contact:

For Rules Interpretation, call (703) 308-4216

For CRF Submission Help, call (703) 308-4212

For PatentIn software help, call (703) 308-6856

**PLEASE RETURN A COPY OF THIS NOTICE WITH YOUR RESPONSE**



GAU 1643

PATENT  
Attorney Docket No. FJN-063  
(3999/66)

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

APPLICANTS: Nakagawa et al.

SERIAL NO.: 09/051,670 GROUP NO.: 1643 *MAR 12 1999*

FILED: September 8, 1998 EXAMINER: D. Romeo *GROUP 1800*

TITLE: NOVEL DNA AND PROCESS FOR PRODUCING PROTEINS BY  
USING THE SAME

**CERTIFICATE OF FIRST CLASS MAILING UNDER 37 C.F.R. 1.8**

I hereby certify that this correspondence, and any documents referred to as enclosed herein, are being deposited with the United States Postal Service as first class mail, postage prepaid, in an envelope addressed to Assistant Commissioner for Patents, Washington, DC 20231 on this 4th day of March, 1999.

*Wendy Martin*  
Wendy Martin

Assistant Commissioner for Patents  
Washington, D.C. 20231

Sir:

Submitted herewith are the following:

Transmittal Form (1 pg.), an Amendment (4 pgs.), a copy of the Substitute Sequence Listing (12 pgs.), a copy of a request for one month extension of time (1 pg.), a postcard receipt and this Certificate of Mailing.

GAU 1643\$  
Box 5 fluorescence



PATENT  
Attorney Docket No. FJN-63  
(3999/66)

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

10X

APPLICANTS: Nakagawa et al.  
SERIAL NO.: 09/051,670 GROUP NO.: 1643-1646  
FILED: September 8, 1998 EXAMINER: D. Romeo  
TITLE: NOVEL DNA AND PROCESS FOR PRODUCING PROTEINS BY  
USING THE SAME

**CERTIFICATE OF FIRST CLASS MAILING UNDER 37 C.F.R. 1.8**

I hereby certify that this correspondence, and any documents referred to as enclosed herein, are being deposited with the United States Postal Service as first class mail, postage prepaid, in an envelope addressed to Assistant Commissioner for Patents, Washington, DC 20231 on this 4th day of March, 1999.

Wendy Martin  
Wendy Martin

**BOX SEQUENCE**

Assistant Commissioner for Patents  
Washington, D.C. 20231

RECEIVED

MAR 15 1999

MAILED  
MATRIX AUTOMATED  
SERVICE CENTER

Sir:

Submitted herewith are the following:

Transmittal Form (1 pg.), Fee Transmittal Form (1 pg.); Response to the Notice to Comply With Requirements for Patent Applications Containing Nucleotide Sequence and/or Amino Acid Sequence Disclosures (2 pgs.), Copy of Notice to Comply With Requirements for Patent Applications Containing Nucleotide Sequence and/or Amino Acid Sequence Disclosures (1 pg.), Paper copy of substitute Sequence Listing (12 pgs), Computer Readable Form of Sequence Listing; Statements Under 37 C.F.R. §§1.821(f) and 1.18(g) (1 pg), Request for one month extension of time (1 pg.), Check in the amount of \$110.00; postcard receipt, and this Certificate of Mailing.



# TRANSMITTAL FORM

|                      |                   |
|----------------------|-------------------|
| Serial Number        | 09/051,670        |
| Filed:               | September 8, 1998 |
| First Named Inventor | Nakagawa          |
| Group Art Unit       | 1643              |
| Examiner Name        | D. Romeo          |
| Attorney Docket No.  | FJN-063           |

**ENCLOSURES (check all that apply)**

- |                                                                                                                                                                                                                                                                                                                                                                                                                          |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <input type="checkbox"/> Fee Transmittal Form<br><input type="checkbox"/> Check Attached<br><input type="checkbox"/> Copy of Fee Transmittal Form<br><br><input checked="" type="checkbox"/> Amendment/Response<br><input type="checkbox"/> After Final<br><input type="checkbox"/> Affidavits/declaration(s)<br><input type="checkbox"/> Letter to Official Draftsperson including Drawings<br><br>[Total Sheets _____] | <input type="checkbox"/> Copy of Notice to File Missing Parts of Application (PTO-1553)<br><input type="checkbox"/> Formal Drawing(s)<br><input type="checkbox"/> Petition Routing Slip (PTO/SB/69) and Accompanying Petition<br><input type="checkbox"/> To Convert to a Provisional Application<br><br><input type="checkbox"/> Power of Attorney (Revocation of Prior Powers)<br><input type="checkbox"/> Terminal Disclaimer<br><input type="checkbox"/> Executed Declaration and Power of Attorney for Utility or Design Patent Application<br><input type="checkbox"/> Small Entity Statement<br><input type="checkbox"/> Request for Refund<br><input type="checkbox"/> After Allowance Communication to Group | <input type="checkbox"/> Appeal Communication to Board of Appeals and Interferences<br><input type="checkbox"/> Appeal Communication to Group ( <i>Appeal Notice, Brief, Reply Brief</i> )<br><input type="checkbox"/> Status Letter<br><input checked="" type="checkbox"/> Return Receipt Postcard<br><input checked="" type="checkbox"/> Certificate of First Class Mailing under 37 C.F.R. 1.8<br><input checked="" type="checkbox"/> Additional Enclosure(s) ( <i>please identify below</i> )<br>A copy of the Substitute Sequence Listing |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|

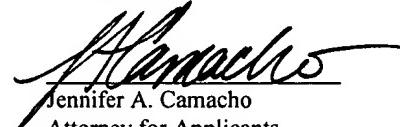
**CORRESPONDENCE ADDRESS**

Direct all correspondence to: Patent Administrator  
 Testa, Hurwitz & Thibeault, LLP  
 High Street Tower  
 125 High Street  
 Boston, MA 02110  
 Tel. No.: (617) 248-7000  
 Fax No.: (617) 248-7100

**SIGNATURE BLOCK**

Date: 3/4/99  
 Reg. No. P43,526  
 Tel. No.: (617) 248-7476  
 Fax No.: (617) 248-7100

Respectfully submitted,

  
 Jennifer A. Camacho  
 Attorney for Applicants  
 Testa, Hurwitz & Thibeault, LLP  
 High Street Tower  
 125 High Street  
 Boston, MA 02110

**TRANSMITTAL  
FORM**

MAR 09 1999

|                      |                   |
|----------------------|-------------------|
| Serial Number        | 09/051,670        |
| Filed:               | September 8, 1998 |
| First Named Inventor | Nakagawa          |
| Group Art Unit       | 1643              |
| Examiner Name        | D. Romeo          |
| Attorney Docket No.  | FJN-063           |

**ENCLOSURES (check all that apply)**

|                                                                                                                                                                                                                                                                                                                                                                                                                                         |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <input checked="" type="checkbox"/> Fee Transmittal Form<br><input checked="" type="checkbox"/> Check Attached<br><input type="checkbox"/> Copy of Fee Transmittal Form<br><br><input type="checkbox"/> Amendment/Response<br><br><input type="checkbox"/> After Final<br><input type="checkbox"/> Affidavits/declaration(s)<br><input type="checkbox"/> Letter to Official Draftsperson including Drawings<br><br>[Total Sheets _____] | <input type="checkbox"/> Copy of Notice to File Missing Parts of Application (PTO-1553)<br><input type="checkbox"/> Formal Drawing(s)<br><input type="checkbox"/> Petition Routing Slip (PTO/SB/69) and Accompanying Petition<br><input type="checkbox"/> To Convert to a Provisional Application<br><br><input type="checkbox"/> Power of Attorney (Revocation of Prior Powers)<br><input type="checkbox"/> Terminal Disclaimer<br><input type="checkbox"/> Executed Declaration and Power of Attorney for Utility or Design Patent Application<br><input type="checkbox"/> Small Entity Statement<br><input type="checkbox"/> Request for Refund<br><input type="checkbox"/> After Allowance Communication to Group | <input type="checkbox"/> Appeal Communication to Board of Appeals and Interferences<br><input type="checkbox"/> Appeal Communication to Group ( <i>Appeal Notice, Brief, Reply Brief</i> )<br><input type="checkbox"/> Status Letter<br><input checked="" type="checkbox"/> Return Receipt Postcard<br><input checked="" type="checkbox"/> Certificate of First Class Mailing under 37 C.F.R. 1.8<br><input checked="" type="checkbox"/> Additional Enclosure(s) ( <i>please identify below</i> )<br>Response to the Notice to Comply With Requirements for Patent Applications Containing Nucleotide Sequence and/or Amino Acid Sequence Disclosures<br>Copy of Notice to Comply with Requirements for Patent Applications Containing Nucleotide Sequence and/or Amino Acid Sequence Disclosures<br>Paper copy of substitute Sequence Listing<br>Computer Readable Form of substitute Sequence Listing<br>Statements Under 37 C.F.R. §§1.821(f) and 1.181(g) |
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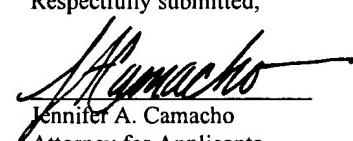
**CORRESPONDENCE ADDRESS**

Direct all correspondence to: Patent Administrator  
 Testa, Hurwitz & Thibeault, LLP  
 High Street Tower  
 125 High Street  
 Boston, MA 02110  
 Tel. No.: (617) 248-7000  
 Fax No.: (617) 248-7100

**SIGNATURE BLOCK**

Date: 3/4/99  
 Reg. No. P43,526  
 Tel. No.: (617) 248-7476  
 Fax No.: (617) 248-7100

Respectfully submitted,

  
 Jennifer A. Camacho  
 Attorney for Applicants  
 Testa, Hurwitz & Thibeault, LLP  
 High Street Tower  
 125 High Street  
 Boston, MA 02110

# FEE TRANSMITTAL

Note: Effective October 1, 1997  
Patent fees are subject to annual revision

MAR 08 1998

Complete if Known

|                           |                   |
|---------------------------|-------------------|
| Application Serial Number | 09/051,670        |
| Filing Date               | September 8, 1998 |
| First Named Inventor      | Nakagawa          |
| Group Art Unit            | 1643              |
| Examiner Name             | D. Romeo          |
| Attorney Docket No.       | FJN-063           |

## METHOD OF PAYMENT

1.  Payment Enclosed:  
 Check  Money Order  Other

2.  The Commissioner is hereby authorized to credit or charge any fee indicated below to Deposit Account No. 20-0531.  
 Required Fees (copy of this sheet enclosed).  
 Additional fee required under 37 CFR 1.16 and 1.17.  
 Overpayment Credit.

## FEE CALCULATION

### 1. FILING FEE

#### Large Entity

| Fee (\$) | Fee Description        | Fee Paid |
|----------|------------------------|----------|
| 760      | Utility filing fee     |          |
| 310      | Design filing fee      |          |
| 150      | Provisional filing fee |          |

| Number Filed | Number Extra | Rate         | Amount |
|--------------|--------------|--------------|--------|
| Total Claims | - 20 = _____ | x \$ 18.00 = |        |

| Independent Claims | - 3 = _____ | x \$ 78.00 = |
|--------------------|-------------|--------------|
|--------------------|-------------|--------------|

Multiple Dependent Claim(s), if any      \$260.00 =

TOTAL:

SMALL ENTITY DISCOUNT:

SUBTOTAL (1) (\$)

### 2. AMENDMENT CLAIM FEES

| Claims Remaining                                                   | Highest No. Previously | Present Extra | Rate         | Fee Paid |
|--------------------------------------------------------------------|------------------------|---------------|--------------|----------|
|                                                                    |                        |               |              |          |
| After Amend.                                                       | Paid For               |               |              |          |
| Total                                                              | - =                    |               | x \$ 18.00 = |          |
| Indep.                                                             | - =                    |               | x \$ 78.00 = |          |
| <input type="checkbox"/> First Presentation of Multiple Dep. Claim |                        |               | + \$260.00 = |          |

SUBTOTAL (3) (\$ 110.00)

SUBTOTAL (1) 0.00

SUBTOTAL (2) 0.00

SUBTOTAL (3) 110.00

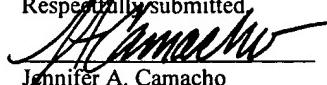
TOTAL (\$ 110.00)

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High Street Tower  
125 High Street  
Boston, MA 02110  
Tel. No.: (617) 248-7000  
Fax No.: (617) 248-7100

## SIGNATURE BLOCK

Respectfully submitted,  
  
 Jennifer A. Camacho  
Attorney for the Applicants  
Testa, Hurwitz & Thibeault, LLP  
High Street Tower  
125 High Street  
Boston, MA 02110